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Chapter 3

The Competitiveness of Central and Eastern European (CEE) Financial Markets

The research seeks to gauge the global competitiveness of Central and Eastern European (CEE) financial markets. The assessment is made using quantitative and hybrid metrics of financial centre development while placing particular emphasis on competitiveness drivers relevant to the activity of global sovereign wealth funds (SWFs) in the CEE region.

Besides an introduction, the study contains sections dealing with: research methodology and objectives; quantitative, quantitative and hybrid metrics of financial market competitiveness and their significance for investment by global SWFs in CEE as well as initiatives aimed at securities market consolidation in the region. The findings lead to conclusions regarding the allure of CEE financial industries to global SWFs. The stylized facts contained in the research are appended by case studies based on selective CEE listed financial markets for which comparable datasets have been available.

Despite continued progress, the financial centres of CEE remain marginal from the pan-European (let alone global) perspective. Their peripheral stance is a legacy of communism which has stifled free enterprise (including capital markets) for almost half a century. Another constraint relates to scale and expertise – the fragmented securities markets of CEE find it difficult to rival their seasoned Western peers bolstered by larger, robust economies and drawing on extensive hands-on experience.

From the viewpoint of a single financial centre, the Warsaw Stock Exchange (WSE) stands out as the most diversified and liquid market, although its days as an independent entity might be numbered – amid a growing trend towards stock market consolidation. The stunted growth of CEE financial centres appears to be a major constraint in wooing global SWFs into the region. One of the remedies is consolidation via merger and acquisition (M&A) activity – already attempted under the auspices of the CEE Stock Exchange Group (CEESEG) and validated by close links (qualitative and quantitative) among CEE markets. Besides consolidating, the CEE financial markets should strive to upgrade the quality of socioeconomic environments in which their financial industries operate and to prioritize the advancement of technical and human infrastructure (prerequisites for attracting high-quality global investment institutions – including SWFs).

3.1. Research methodology and objectives

The methodology of the research combines the use of quantitative and qualitative competitiveness metrics. The former focus on trading magnitude and intensity in key market segments (equity, fixed income, financial derivatives), whereas the latter seek to synthesize instrumental factors (a selection of socioeconomic competitiveness rankings) and financial centre assessments (gleaned from external respondents). Numerous caveats should be attached to both approaches. They relate to the growing prominence of trading in over-the-counter (OTC) financial instruments (unaccounted for or underreported in official statistics), subjective biases in surveys (based on a sample of responses), misinterpretation of (positive or negative) synergies existing among the market segments, as well as idiosyncrasies affecting the activity of a single financial centre (difficult to benchmark across a peer group).

The ultimate objective of the study is to assess the “friendliness” of CEE financial centres to global SWF investments and to produce policy recommendations aimed at improving the investment climate of the CEE economies to global SWFs. Both goals have not been adequately addressed by scholars and policymakers to date – thus the study is a pioneering effort in this regard.

3.2. Quantitative drivers of a globally competitive financial centre

Financial centres can be judged in multiple ways. Traditionally, their competitiveness has been assessed using metrics embodying the breadth (diversity, heterogeneity, product selection (cf. Michie, Oughton 2013) and depth (volume, liquidity, capacity, cf. Sarr, Lybek 2002) of trading activity. In line with such assumptions, a globally competitive financial centre should offer a rich and comprehensive selection of investment opportunities needed to construct an efficient portfolio (Choueifaty, Coignard 2008d) while on the other hand, it should maximize the likelihood of seamless trade execution (both goals are of paramount importance to SWFs whose investment holdings are bulky, dispersed globally, and increasingly diversified by asset class and financial instrument). Such an approach, although intuitive in interpretation and methodology, has a few serious practical drawbacks:

- statistical misrepresentation: as over-the-counter (OTC) (usually unregulated and relatively opaque) markets gain traction in global finance, the magnitude of their activity (vs. listed markets) can be understated due to information scarcity (Nystedt 2004) – this constraint is particularly relevant to emerging economies where the bulk of trading is done on an OTC basis (owing to the relative underdevelopment of local public exchanges);
- globalization: the competitiveness of a single financial centre is critical, however, in view of the rising degree of globalization it is by far more important how a local financial system can interact with and leverage the functionality of other centres (cf. Walter 1998) – such a reservation applies directly to emerging markets whose socioeconomic progress is to a large extent a function of their openness to the external world;
- scale effects: small economies are at a clear disadvantage, as the broad infrastructure necessary to help nurture an internationally competitive financial centre is so significant that it can disproportionately favour large countries (World Economic Forum 2016) – this issue is further complicated by CEE's ongoing integration with the European Union (itself commanding several globally competitive financial centres operating across national borders);
- synergies (classical and reverse): the sheer size of segments making up a financial centre does not account for their linkage and the collective value (created or destroyed) in the process – there is no single metric that would adequately capture investment activity in any of the market segments (furthermore – their boundaries have blurred in recent decades).

In view of such limitations, a quantitative analysis of financial centre competitiveness should, ideally, encompass all major investment asset classes (group of investments that display similar characteristics) and their specific metrics. Among asset types routinely used by institutional investors are categories considered traditional (equity, bonds, cash and cash equivalents) and those deemed alternative (all non-traditional investments including: natural resources, commodities, real estate, infrastructure, intellectual property, financial derivatives, structured products, artworks, antiques, collectibles as well as hedge, private equity- and exchange traded funds) (CAIA 2016; Investopedia 2016).

In practice, however, information disclosure standards prevalent internationally further restrict the selection to the following publicly tradable categories:

- equity (turnover, number of trades, market capitalization, and number of listings) – this category demonstrates the extent and quality of global investors' commitment to corporate co-ownership (which can imply active or passive strategies with regard to company stock);
- bonds (turnover, number of trades, number of listings) – as a quasi-lending form of financing, the scale of investments in debt instruments underlies the perception of investors as to a favourable interplay between yields and creditworthiness with regard to corporate, municipal and sovereign debt;
- financial derivatives (notional turnover, number of contracts traded) – three major strategies predominate among investors in financial derivatives: speculation (seeking capital gains via active risk taking), hedging (mitigating the risk of volatility in asset prices) and arbitrage (exploiting pricing inefficiencies for particular assets or their combinations).

In the SWF context, the aforementioned asset classes can be entered into directly or through financial intermediaries (i.e. other asset management institutions). No matter how convoluted the investment strategies employed, the proposed quantitative assessment offers a snapshot of the financial centres covered.

Appendices 3–8 contain the aforementioned metrics for selective CEE markets (the Bucharest Stock Exchange, the Bulgarian Stock Exchange – Sofia, the Budapest Stock Exchange, the Ljubljana Stock Exchange, the Prague Stock Exchange and the Warsaw Stock Exchange). The appendices contain quantitative data on the three major asset classes (market segments): equity, bonds and derivatives with further specifics on order handling routines (e.g. electronic or manual) and collective investment schemes (e.g. Undertakings for Collective Investment in Transferable Securities, UCITS; Exchange Traded Funds, ETFs) used by the markets. The trading datasets also comprise information on market size, turnover and listing numbers for the specific segments covered. The following takeaways can be gleaned from the appendices:

- peripheral significance: despite lofty aspirations, the CEE market remain local in their outreach and are struggling to develop a supranational

presence (internationalization of capital flows, attracting foreign issuers, supplying complex, multipartite professional services) – the fragmentation of CEE’s markets does not seem to be working to the region’s overall advantage;

- limited breadth and depth: the CEE economies have made great strides in cultivating their financial centres, yet most of them remain relatively undiversified and illiquid (the post-communist transition is lengthy) – additionally, the region’s markets exhibit low penetration by modern and flourishing financial instruments (financial derivatives, ETFs and UCITS);
- consolidation: M&A activity is afoot (e.g. CEESEG) to improve the increasingly fragile economics of financial centres in the face of rising regulatory costs and rigor, falling fees as well as stiffening competition from non-CEE exchanges and multilateral trading facilities (MTFs) – consolidation among securities markets can occur both de jure (formal M&A alliances) and de facto (intense trading activity between or among individual markets);
- Warsaw’s pre-eminence: the Warsaw Stock Exchange outranks the other CEE financial centres by most quantitative counts and exhibits unparalleled breadth of activity (cf. Gál 2015) – the Polish bourse is reaping scale-related and first-mover advantages (the largest EU member in the CEE peer group and a CEE pioneer to have embraced a liberally mined “shock therapy”).

Judging by the quantitative metrics reviewed in this research, the CEE financial centres in general fail to deliver the diversity and liquidity necessary to accommodate large-scale investments of the world’s leading SWFs – whose assets for the top ten institutions range between US\$ 236.0 billion and 847.6 billion as at 30 April 2016 (SWFI 2016).

3.3. Qualitative and hybrid drivers of a globally competitive financial centre

As previously mentioned, quantitative metrics of financial centre competitiveness based on the intensity of financial activity do not fully capture the holistic aspect of what underpins a globally recognizable financial environment. Usually, qualitative (or hybrid) competitiveness

drivers are incorporated to demonstrate a more comprehensive approach. Numerous variables make up such methodologies, yet their essence comes down to effective, albeit nonintrusive, regulations, ease of doing business and the existence of investment friendly social factors (Securities Industry Association 2008).

Open and fair financial markets with particular emphasis on legal remedies available to minority stockholders in the event of abuse, are of paramount importance as financial institutions, let alone individuals, usually play this role (cf. Rose 2014).

Free flow of capital and a convertible currency matter to financial investors as they facilitate effective investment repatriation by international institutions and individuals and help minimize transaction costs (cf. Odonnat 2008).

The availability of a skilled workforce and flexible labour laws help supply local talent and downsize hire/fire costs. It is noteworthy that emerging markets globally face a shortage of adequately trained staff while the complexity of financial products and services continues to grow. For some emerging markets it is possible to reclaim some of the foreign-educated talent to their own advantage (Giannetti, Liao 2013).

The use of a globally familiar language simplifies business interaction; clearly, countries where English serves as an official language or where it is widely spoken have an edge over those whose official tongue is of merely local or regional significance (Madden, Wan Nursofiza 2015).

A fair, transparent, efficient legal and regulatory regime, on the one hand, offering remedies in the event of contractual breaches, while, on the other hand, not materially distorting commercial activity, sets the stage for a predictable and well-oiled corporate governance environment.

Not only do sound and fair tax levies represent a sizable cost of doing business, yet the need to mollify a fickle fiscal regime results in risk exposure which is difficult to quantify, mitigate and can undermine commercial rationalism. With the leeway existing in the European Union regarding national tax systems, fiscal competition plays a particularly vital role.

Implementation of international standards and best practices (e.g. IOSCO and BIS): in an era of rising corporate, social responsibility and transparency shows the extent to which financial institutions and sectors are able to demonstrate compliance with international best practices, which can be viewed as a precious intangible.

A low cost of doing business (minimal “red tape” and bureaucratic inertia, etc.) helps preserve a healthy balance between requisite regulatory rigour and friendliness to businesses and businesspeople.

Although standards of technical infrastructure only indirectly affect financial businesses and individuals, they can often prove decisive in decisions to undertake or maintain financial activity in a given locality. Besides any infrastructural improvement needs lasting financial commitments which is hardly achievable by emerging economies.

Any volatility in government political and economic decision-making complicates current and future activity in the financial space, especially if such decision-making strays from rationality. That is precisely why the political environment of financial markets ranks atop of the competitiveness criteria vital for global supremacy among such centres.

Although valuable insights can be derived from a cross-sectional analysis of quantitative measures showing financial competitiveness, there is infinitely more to the competitive power of a financial centre than the sheer scale of its business. In practical terms, some centres can be viewed less favourably than their proven financial fundamentals, while some can punch far above their weight. This phenomenon tells us that competitive factors surrounding a financial centre are often difficult to categorize and quantify. Arguably, the Global Financial Centres Index (GFCI) pioneered by the British think tank Z/Yen (Z/Yen 2015) stands out as the most comprehensive and advanced way of integrating quantitative and qualitative competitive factors into a synthetic metric of financial centre competitiveness.

The GFCI’s methodology is based on a “factor assessment model” that uses two distinct sets of input (Z/Yen 2015):

- “instrumental factors: objective evidence of competitiveness was sought from a wide variety of comparable sources. For example, evidence about a just and reliable business environment was drawn from a corruption perception index (supplied by Transparency International), an ease of doing business index (from the World Bank) and an operational risk rating (from the EIU). A total of 105 instrumental factors were used in GFCI 16. And all financial centres are represented in all the external sources, and the statistical model takes account of these gaps.

- financial centre assessments: by means of an online questionnaire, running continuously since 2007. In GFCI 16, 29,226 financial centre assessments were drawn from 3,633 respondents.”

It is noteworthy that several CEE financial centres were ignored by the GFCI for a variety of reasons (the most important of them are limited institutional transparency and inadequate statistical significance – a function of negligible impact on worldwide financial markets). The six CEE markets making up GFCI 16 comprised: Prague (the Czech Republic), Warsaw (Poland), St. Petersburg and Moscow (Russia), Budapest (Hungary), and Tallinn (Estonia).

Figure 3.1 illustrates the fortunes of the selected CEE emerging markets throughout the surveyed period (March 2007–September 2014), which corresponds to the 16 editions of the study. Several conclusions can be drawn from the trajectory of competitiveness for the CEE financial markets, however, among the most striking features are:

- intra-CEE correlations: all the CEE financial centres under survey demonstrate an astonishing degree of correlation, which argues for homogeneity in the approach to the region from the perspective of financial industry competitiveness – despite disparate tempos of macroeconomic growth and convergence with more established EU members, most CEE economies continue to be put in the “emerging Europe” investment basket (MSCI 2016);
- high volatility (especially mid-crisis): the CEE financial centres exhibit heightened risk (measured by GFCI score volatility), which spiked far above the worldwide GFCI average during the global financial crisis of 2007–2009 (cf. Kern 2010) – the CEE emerging economies are still viewed as risky bets and in times of global economic turbulence suffer a flight of speculative capital (Kurnyaeva 2012);
- role of non-quantitative (“soft”) factors: as with other global financial centres, quantitative drivers of financial centre competitiveness only partially explain the standings of individual centres, as qualitative determinants play a pivotal role (Bourse Consult 2013) – e.g. Warsaw’s rankings are held back by such factors – many CEE economies continue to benefit from sustained investments in diverse elements of technical and human infrastructure accomplished in the communist era and their subsequent commercialization following the fall of communism;

- global underperformance: despite ongoing convergence with modern financial industries worldwide, CEE GFCI scores are still lagging behind the global average, which is a legacy of backwardness from the communist era and the high tempo of growth by financial capitalism globally (often labelled as “financialization”).

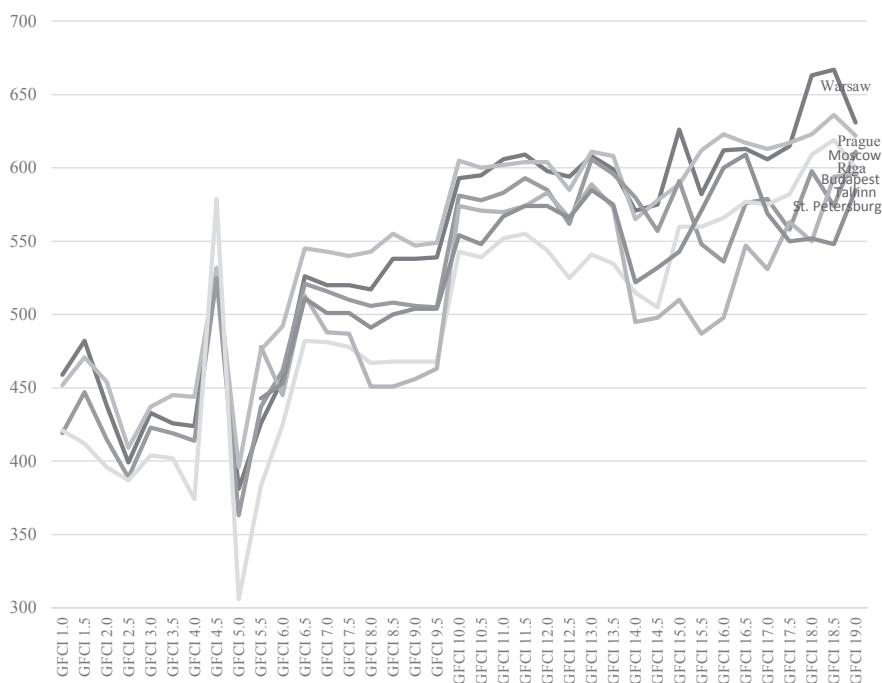


Figure 3.1. Global Financial Centre Index (GFCI) Scores for: Prague, St. Petersburg, Budapest, Moscow, Tallinn and the Average (worldwide) GFCI Score for March 2007 (GFCI 1)–September 2014 (GFCI 16)
Source: Long Finance website (the GFCI Over Time online interface): <http://www.longfinance.net/programmes/financial-centre-futures/gfcigraph.html> [accessed: 1.09.2015]. Note: GFCI Editions 1–16 covered the 84 most representative financial centres worldwide.

3.4. The competitiveness of CEE financial centres and its significance for SWF investment activity

Given the limited clout of the existing Russian SWFs in global terms (US\$ 152.20 bn of aggregate assets under management shared among three funds, thereby representing 2.09% of the global SWF asset total as of April 2016) and their recent self-absorption (the SWFs have been compelled to prop up the increasingly frail Russian economy in the wake of international sanctions

imposed after the Russian military intervention in Ukraine), the activity of global SWFs in CEE can be narrowed to foreign i.e. non-CEE SWFs' investment allocations to the region. Therefore, CEE's ability to offer a globally competitive socioeconomic environment is instrumental in wooing further inward investment by SWFs into CEE.

In this context, it is worth revisiting the hallmarks of SWFs investment activity:

- scale: SWFs top the rankings of global alternative investment institutions by assets under management – followed by private equity-, exchange traded-, and hedge funds (Bardalai et al. 2015), as such they have to allocate their portfolios in a way that would safeguard enough liquidity to accommodate large-scale transactions;
- long-termism: SWFs are long-term investors whose competitive edge lies in their ability to wait out protracted macroeconomic cyclicality in the pricing of asset classes (Bolton et al. 2012) – this trait implies exposure to macroeconomic and political risks in the host countries and the need to mitigate them (through pre-transaction due diligence and hands-on portfolio management);
- diversification: in an era of soaring inter- and intra-asset correlations, SWFs need to diversify their investment portfolios more vigorously across an ever broader array of asset classes and individual instruments (Aït-Sahalia, Xiu 2015) – this necessity sways SWFs towards financial markets offering sufficient investment variety;
- risk adjusted efficiency: as the current yields of fixed-income instruments are at record lows and the outlook for other (traditional and alternative) asset classes remains mixed, SWFs are increasingly inclined to pursue investments providing a favourable risk/reward mix (Wiśniewski 2015) – this pursuit is even more important for fuel-based SWFs (squeezed by the price erosion of their exports).

It is to what extent the CEE financial markets are able to deliver on these priorities related to the activity of global SWFs that will determine the future course of investment by this largest class of alternative investment management in the region.

3.5. CEE Stock Exchange Group as an example of business amalgamation

The CEE Stock Exchange Group (CEESEG) is a holding company currently comprising the stock exchanges of Vienna (Austria) and Prague (Czechia). The holding company, emerged as the outcome of business combinations of CEE stock exchanges by the Vienna Stock Exchange after the collapse of communism in CEE. The group is the largest stock exchange alliance to emerge thus far in all CEE and its strategy is aimed at deriving regional synergies from the individual CEE markets (whose independent expansion might be hampered by scale-related constraints). Among synergies envisaged as part of the consolidation drive is the home-market principle whereby the needs of small and medium capitalization issuers are best met by local exchanges.

While each member continues to support its local market under independent management, at the international level, the alliance acts as CEE Stock Exchange Group v all major professional market participants (which provides more bargaining power in cost negotiations). Additionally, both CEESEG members are engaged in numerous initiatives to raise the visibility of the alliance and to attract the attention of institutional investors, trading participants, data vendors and index licensees to CEE. Both exchanges profit from close cooperation and know-how transfers as well as from joint coverage of the CEE region.

The bipartite bloc has emerged as a result of complex M&A activity in CEE. In 2015, CEESEG adapted its business model to the changed market environment and disposed of its former stakes in the Budapest and Ljubljana stock exchanges. In order to ensure sustainable competitiveness, the group decided to shift from direct investment to co-operation in data vending, index licensing and information technology services spanning twelve other stock exchanges in CEE. These synergy effects and the common brand make it possible for the local markets to enhance networking with international customers.

3.6. CEE financial centres' reform agenda

Plenty needs to be done to upgrade the economic environments in which the CEE financial industries operate. Such reforms need to embrace both aspects directly relevant to the process of allocating investments and broader settings of the financial marketplaces. Among the reform initiatives that would help

to raise the competitiveness of the CEE financial centres are: smart deregulation, globalization, improvements in infrastructure and a stronger domestic capital base.

The CEE financial industries have been erected on the ashes of communism, however, vestiges of the command economy linger on (they are usually tied to state interventionism) – the CEE financial jurisdictions should strike a delicate balance between the need to safeguard a responsible and transparent doing-business environment and much-needed liberalization. A gentle, yet persuasive regulatory touch appears to be the answer.

The CEE economies and financial industries would benefit enormously from increased exposure to global capital flows – this can be achieved via deregulation and openness to foreign capital (both of which are hallmarks of intense globalization).

Despite an extended payback, advanced infrastructure is a *sine qua non* for developing an internationally competitive financial centre – infrastructural investments are exceptionally cumbersome for emerging markets whose budgets often operate on a shoestring, however, lasting and material commitments to this area are considered particularly beneficial for the breadth and depth of financial markets.

Finally, the strength of domestic financial institutions determines financial market stability in the event of foreign capital flight and helps reduce market volatility (systemic risks). This is the reason why even globally minded financial centres need to nurture their home capital base – not only to provide easily accessible investment opportunities to local clients, but also to render the domestic financial market more competitive in risk-adjusted terms.

Conclusions

Despite brisk expansion, successful restructuring and ongoing convergence with developed European countries, the financial markets of CEE continue to trail their more experienced European peers. Besides the lingering legacy of communism, the CEE financial industries face other serious challenges related to limited scale, inadequate globalization, lack of domestic financial resources and institutions as well as obsolete infrastructure.

These weaknesses constrict the potential for more SWF investment in the region. SWFs, as the most powerful player among alternative asset managers, seek efficient, abundant and liquid capital markets to accommodate

their increasingly sizable and diversified portfolios. Given the interdependence of global financial markets, investment exposure to CEE investment assets can be developed indirectly: using more advanced financial centres, which is the case for most SWFs involved in CEE.

To overcome such constraints and attract a high-quality, value-adding institutional investor base (including a more conspicuous SWF presence), the CEE financial centres need to work out strategies consistent with national priorities, which will help ensure the commitment to and continuity of further socioeconomic reforms.

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